

CLAIMS

What is claimed is:

1. A system for facilitating input management in a computerized environment, the system comprising:

an input manager for processing events received from an input provider; and

a staging area for holding events processed by the input manager and allowing access by external components.

2. The system of claim 1, wherein the staging area comprises a stack of events created by the input manager.

3. The system of claim 1, further comprising at least one filter for accessing the staging area, wherein the filters are configured to modify the staging area.

4. The system of claim 3, further comprising a mouse filter, a keyboard filter, and a stylus filter.

5. The system of claim 3, further comprising user-defined filters for facilitating use of unknown input devices.

6. The system of claim 3, further comprising at least one monitor for monitoring manipulation of events in the staging area.

7. The system of claim 6, further comprising a mouse monitor, a keyboard monitor, and a stylus monitor.

8. The system of claim 6, further comprising a user-defined monitor for association with an unknown input device.

9. The system of claim 1, wherein each event in the staging area includes a dictionary for storing a state associated with the event.

10. The system of claim 9, further comprising a promoter for promoting a first type of event to a second type of event.

11. The system of claim 10, wherein the second type of event inherits the dictionary associated with the first type of event.

12. A system for facilitating input management in a computerized environment, the system comprising:

a staging area including a stack of input events;

a set of filters capable of accessing and manipulating the stack of input events;

and

a set of monitors capable of monitoring manipulation of the stack of events.

13. The system of claim 12, further comprising an input management system for receiving input reports and transmitting the input reports to the staging area.

14. The system of claim 12, wherein the set of filters comprises a mouse filter, a keyboard filter, and a stylus filter.

15. The system of claim 12, wherein the set of filters comprises at least one user-defined filter.

16. The system of claim 12, wherein the set of monitors comprises a mouse monitor, a keyboard monitor, and a stylus monitor.

17. The system of claim 12, further comprising a dictionary associated with each event in the stack, wherein the dictionary stores an event state.

18. The system of claim 17, further comprising at least one promoter for promoting a first type of event to a second type of event.

19. The system of claim 18, wherein the second type of event includes a dictionary inherited from the first type of event.

20. A method for managing input to facilitate third party access, the method comprising:

processing input events by creating a staging area including a stack of input events; and

providing third party listener access to the staging area to enable a third party to monitor events in the staging area.

21. The method of claim 20, further comprising manipulating events in the stack using a filter.

22. The method of claim 21, further comprising manipulating events in the stack using at least one of a mouse filter, a keyboard filter, and a stylus filter.

23. The method of claim 21, further comprising manipulating events in the stack using a user-defined filter.

24. The method of claim 20, further comprising associating a dictionary with each event in the stack.

25. The method of claim 24, further comprising defining a state of each event in a stack with the associated dictionary.

26. The method of claim 25, further comprising promoting a first type of event to a second type of event.

27. The method of claim 26, wherein the first type of event involves unknown input.

28. The method of claim 27, further comprising the second type of event with the dictionary associated with the first type of event.

29. A computer readable medium storing the computer executable instructions for performing the method of claim 20.

30. A method for facilitating input management in a computerized environment, the system comprising:

operating a staging area including a stack of input events;

accessing and manipulating the stack of input events using at least one filter; and

monitoring manipulation of the stack of events using at least one monitor.

31. The method of claim 30, further comprising receiving an input report from an input provider and using input report information to construct the stack.

32. The method of claim 30, further comprising storing a dictionary for each event in the stack, wherein each dictionary defines an event state.

33. The method of claim 32, further comprising identifying an event unknown to an application, and promoting the unknown event to a known event.

34. The method of claim 33, further comprising associating the dictionary from the unknown event with the known event.

35. A computer readable medium having computer executable instructions for performing the method of claim 30.

36. A method for providing an application with event notification, the method comprising:

receiving a primary event notification, the primary event including a dictionary;
pushing a secondary event onto a stack in response to the primary event;
providing the secondary event with the dictionary from the primary event; and
sending both the secondary event and the primary event to the application.

37. A system for exposing events for both a logical input device and a physical input device, the system comprising:

a promoter for converting logical input associated with an event to physical input;
and

a dictionary accessible to an application, wherein the dictionary associates the logical input related to the event with the physical input.